

(b) 1. Except as provided in subd. 2., the application for a sanitary permit shall be submitted to the appropriate governmental unit where the POWTS is located or will be located.

2. The application for a sanitary permit shall be submitted to the department for a POWTS that is located or will be located on property owned by the state.

Note: Section 145.20 (2) (b), Stats., states that the governmental unit responsible for regulation of private sewage systems shall approve or disapprove applications for sanitary permits and assist applicants in preparing an approvable application.

(c) The application for a sanitary permit to the governmental unit shall be accompanied by all of the following:

1. At least one set of clear and legible plans and specifications delineating the information under s. Comm 83.22 (2) (a) 3. and (c).

2. A set of plans bearing the department's conditional approval and the approval letter issued by the department, if required to be reviewed by the department under s. Comm 83.22 (1).

3. Sufficient supporting information to determine whether the proposed design, installation and management of the POWTS or the proposed modification to an existing POWTS conforms with this chapter.

4. Documentation that the master plumber or the master plumber-restricted who is to be responsible for the installation or modification of the POWTS has completed approved training on the proposed POWTS technology or practice, if the application for the sanitary permit involves one or more of the technologies or practices specified in s. Comm 83.04 (1).

5. Documentation that maintenance requirements for the proposed POWTS technology or practice have been recorded with the deed for the property, if the management plan for the installation or modification under s. Comm 83.54 (1) involves one of the following:

a. Evaluating or monitoring any part of the system at an interval of less than 12 months.

b. Servicing or pumping of any part of the system at an interval of less than 12 months.

6. Any other information as specified by local ordinance relating to POWTS installations.

7. A fee as specified by the governmental unit.

Note: Section 145.19 (2) to (6) reads: (2) Fee. No fee for a sanitary permit may be less than \$61, or the amount determined under department rule. The governing body for the governmental unit responsible for the regulation of private sewage systems may establish a fee for a sanitary permit which is more than \$61, or the amount determined under department rule. [Pursuant to s. Comm 2.67 (1), the minimum sanitary permit fee is \$116.]

(3) Copy of permit forwarded to the department. The governmental unit responsible for the regulation of private sewage systems shall forward a copy of each valid sanitary permit and \$20, or the amount determined under department rule, of the fee to the department within 90 days after the permit is issued. [Pursuant to s. Comm 2.67 (2), the \$50 of the sanitary permit fee is to be forwarded to the department.]

(4) Use of fee. The portion of this fee retained by the governmental unit responsible for the regulation of private sewage systems shall be used for the administration of private sewage system programs.

(5) Fee adjustment. The department, by rule promulgated under ch. 227, may adjust the minimum permit fee under sub. (2) and the fee portion forwarded under sub. (3).

(6) Groundwater fee. In addition to the fee under sub. (2), the governmental unit responsible for the regulation of private sewage systems shall collect a groundwater fee of \$25 for each sanitary permit. The governmental unit shall forward this fee to the department together with the copy of the sanitary permit and the fee under sub. (3). The moneys collected under this subsection shall be credited to the environmental fund for environmental management.

(3) PROCESSING. (a) A sanitary permit may not be issued until the plans and specifications have been approved by the department or governmental unit having jurisdiction.

(b) A governmental unit may not issue a sanitary permit for the installation or modification of the POWTS that involves one or more of the technologies or practices specified in s. Comm 83.04 (1) unless the master plumber or the master plumber-restricted who is to be responsible for the installation has completed approved training on the proposed POWTS technology or practice in accordance with s. Comm s. Comm 83.05.

(c) A governmental unit shall review and make a determination on the submission of an application for a sanitary permit within 30 days after receiving all the required information and fees under sub. (2) (e).

(d) 1. If upon review of the application and the supporting information, the governmental unit or the department determines that the proposed design, installation and management of the POWTS or the proposed modification of an existing POWTS conforms with this chapter, a sanitary permit shall be issued.

2. a. If upon review of the application and the supporting information, the governmental unit or the department determines that the proposed design, installation and management of the POWTS or the proposed modification of an existing POWTS does not conform with this chapter, a sanitary permit may not be issued.

b. When the issuance of a sanitary permit is denied, the governmental unit or department reviewing the application shall provide in writing to the applicant the reasons for denial, a notice for the right to appeal and the procedures for appeal.

c. An applicant denied a sanitary permit by a governmental unit may appeal the decision in accordance with ch. 68, Stats.

d. The appeal of the denial by the department for a sanitary permit shall be made in writing within 30 days from the date of the decision.

(d) A sanitary permit shall be issued by the appropriate governmental unit or the department in a format prescribed by the department.

Note: See appendix for further information relative to the permit format.

(4) TRANSFERS. A sanitary permit may be transferred from an owner to a subsequent owner, pursuant to s. 145.135 (1), Stats.

Note: Section 145.135 (1), Stats., reads in part: "A sanitary permit may be transferred from the holder to a subsequent owner of the land, except that the subsequent owner must obtain a new copy of the sanitary permit from the issuing agent."

(5) EXPIRATION. Pursuant to s. 145.135 (1), Stats., a sanitary permit shall expire 2 years from the date of issuance unless renewed in accordance with sub. (6).

(6) RENEWALS. (a) 1. The application for renewal of a sanitary permit shall be made in a format prescribed by the department.

Note: See appendix for further information relative to the application for renewal format.

2. The application for renewal of a sanitary permit shall be submitted to the department or the appropriate governmental unit in accordance with sub. (2) (b).

(b) The renewal of a sanitary permit shall be contingent upon the proposed POWTS or the proposed modification of an existing POWTS conforming with the rules of this chapter in effect at the time the sanitary permit is renewed.

(7) REVOCATION. (a) The department may revoke a sanitary permit issued under this section for any false statements or misrepresentation of facts on which the sanitary permit was issued.

(b) A governmental unit may revoke a sanitary permit that the governmental unit has issued under this section for any false statements or misrepresentation of facts on which the sanitary permit was issued.

(c) The revocation of a sanitary permit and the reasons for revocation shall be conveyed in writing to the individual to whom the sanitary permit was issued or transferred.

(d) If a sanitary permit is revoked, the installation or modification of a POWTS may not commence or continue until another sanitary permit is obtained.

(8) POSTING. When a sanitary permit is obtained under sub. (2), the sanitary permit shall:

(a) Be posted in such a location and manner on the proposed site where the POWTS is to be installed or modified so that the information on the permit is visible for inspection; and

- (b) Remain posted until:
1. The POWTS installation or modification is completed; and
 2. An opportunity for a final inspection occurs in accordance with s. Comm 83.26.

Comm 83.22 PLAN REVIEW AND APPROVAL. (1) SUBMISSION OF PLANS. (a) Plans shall be submitted to the department, a designated agent or the governmental unit in accordance with this section for all of the following types of installations or modifications:

1. The installation or construction of a POWTS.
2. The replacement or addition of a POWTS treatment component.
3. The replacement or addition of a POWTS holding component.
4. The replacement or addition of a POWTS dispersal component.

(b) Plans for the types of POWTS delineated in Table 83.22-1 shall be submitted to the department for review.

(c) Plans for the types of POWTS delineated in Table 83.22-2 shall be submitted for review to the department or a designated agent.

Note: See s. Comm 83.23 for more information relative to designated agents.

(e) Plans for the types of POWTS delineated in Table 83.22-3 shall be submitted for review to the appropriate governmental unit where the POWTS is located or will be located.

**Table 83.22-1
PLAN SUBMISSIONS
TO DEPARTMENT**

Type of Installation
1. POWTS owned by the state.
2. Facilities owned by the state and served by POWTS.
3. POWTS that will not completely utilize treatment and dispersal technologies or methods either previously approved under s. Comm 84.10 (2) or (3) or recognized under s. Comm 83.61.
4. POWTS treating domestic wastewater combined with industrial wastes ^a .
5. Experimental POWTS under s. Comm 83.27.

Note a: See s. Comm 83.32 (3) (a).

Table 83.22-2
PLAN SUBMISSIONS
TO DEPARTMENT OR DESIGNATED AGENT

Type of Installation
1. POWTS that will completely utilize treatment and dispersal technologies or methods either previously approved under s. Comm 84.10 (2) or (3) or recognized under s. Comm 83.61.
2. POWTS that collect and hold all wastewater of the facilities served and utilize holding components either previously recognized under s. Comm 84.10 (2) or (3) or recognized under s. Comm 83.61.

Note: Pursuant to s. 145.19 (2), Stats., governmental units may require separate plan examination fees or include these fees in the cost of the sanitary permit.

Table 83.22-3
PLAN SUBMISSIONS
TO GOVERNMENTAL UNIT

Type of Installation
1. POWTS that will serve a single one- or 2-family dwelling utilizing technologies or methods either previously recognized under s. Comm 84.10 (2) or (3) or recognized under s. Comm 83.61, and using gravity distribution of the effluent to an in-ground distribution cell.

Note: Pursuant to s. 145.19 (2), Stats., governmental units may require separate plan examination fees or include these fees in the cost of the sanitary permit.

(2) PLANS AND SPECIFICATIONS. (a) 1. When plans are submitted to the department or designated agent for review, at least 3 sets of plans and one set of specifications shall be provided.

Note: Specifications for a project do not have to be a separate document but may be delineated on the plans.

2. Plans and specifications submitted for review shall be clear, legible and permanent copies.

3. Plans submitted for review shall include all of the following:

a. Details and configuration layouts depicting how the design is to be constructed and how the design is to accomplish the treatment in accordance with ss. Comm 83.43 and 83.44 and dispersal that is claimed or the holding of wastewater.

b. Specifications, including a description of the materials for the project and the installation or construction practices and methods to be employed.

c. A site plan with a bench mark either scaled or dimensioned, delineating all treatment and dispersal components and their relationship to any items listed in Table 83.43-1.

(b) 1. All plans submitted for review shall be accompanied by sufficient data and information to determine if the proposed POWTS or modification of an existing POWTS and their performance will conform with chs. Comm 82 to 84 including, but not limited to all of the following:

a. A plan review application form specified by the department.

Note: See appendix for an example of the plan review application form.

b. The minimum and maximum wastewater flow and load of the proposed project and the method or rationale for determining the flow and load.

c. Documentation to support treatment and dispersal claims.

d. A management plan for the proposed design reflecting conformance to subch. V.

e. A soil and site evaluation report for those POWTS components that consist in part of in situ soil.

f. A description of a contingency plan in the event the proposed POWTS fails and cannot be repaired.

2. In addition to the information required under subd. 1., plans for one or more holding tanks serving a large commercial, industrial, recreational or residential development with an estimated daily wastewater flow of 3,000 gallons or more shall include information pursuant to s. NR 113.07 (1) (e).

Note: Section NR 113.07 (1) (e) reads as follows: Large commercial, industrial, recreational or residential development holding tank systems that singly or when added to together or increased by successive additions generate 3000 gallons of septage per day or greater shall contract with a wastewater treatment facility for treatment of the septage. The contract terms shall provide assurance that the septage from the system will continually be conveyed to, and accepted, at the wastewater treatment facility. If a service area designation exists, the wastewater treatment facility shall amend the service area to include the commercial, industrial, recreational or residential development. The department may not indicate sufficient disposal capacity to the department of industry, labor and human relations, or department of commerce, until the service area adjustments have been completed and approved.

3. In addition to the information required under subd. 1., plans for a POWTS that is to serve a dwelling where the design of the POWTS is not based upon the number of bedrooms within the dwelling shall be accompanied by information documenting that design condition on the deed for the property.

4. In addition to the information required under subd. 1., plans for an experimental POWTS shall be accompanied by information that does all of the following:

- a. Describes the resources of the owner or agent to operate and maintain the POWTS.
- b. Describes the objectives of the experiment relative to the POWTS treatment or dispersal capabilities.
- c. Proposes a schedule for installing, monitoring, reporting and concluding the experiment.
- d. Identifies the person or entity responsible for conducting the experiment.

5. In addition to the information required under subd. 1., plans for a POWTS which is to serve more than one structure or building shall be accompanied by information that does all of the following:

- a. Describes the resources of the owner or owners to operate and maintain the POWTS.
- b. Describes the legal entity, public or private, that has responsibility for the operation and maintenance of the POWTS.
- c. Includes a copy of a recorded legal document that identifies all the parties that have ownership rights and are responsible for the operation and maintenance of the POWTS.

6. a. In addition to the information required under subd. 1, plans for a POWTS with a design wastewater flow exceeding 12,000 gallons per day shall be not be approved until documentation has been submitted to the department indicating that the department of natural resources has issued a WPDES permit for the project under ch. 283, Stats.

b. Solely for the purpose of determining the applicability of subpar. a., the design wastewater flow of 12,000 gpd shall be deemed equivalent to 85 bedrooms for residential dwellings, including one- and 2-family dwellings, multi-family dwellings and mobile homes.

c. Solely for the purpose of determining the applicability of subpar. a., the design wastewater flow of 12,000 gpd for commercial facilities shall be calculated using the estimated wastewater flows specified in s. A-83.43 (6) of the appendix.

d. Solely for the purpose of determining the applicability of subpar. a., for residential dwellings combined with commercial facilities the design wastewater flow of 12,000 gpd shall be calculated by prorating the number of bedrooms on the basis of 85 bedrooms equaling 12,000 gpd for the residential dwellings and using the estimated flow under s. Comm 83.43 (3) (a) and s. A-83.43 (6) of the appendix to calculate the design flow for the commercial facilities.

e. For purpose of determining the applicability of subpar. a., the design wastewater flow of 12,000 gpd shall include the design wastewater flow of all POWTS that are located on the same property or on properties under the same ownership and where the perimeter of a distribution cell of a POWTS dispersal component for one POWTS is less than 1,500 feet from the perimeter of a distribution cell of a POWTS dispersal component of any other POWTS under the same ownership.

f. For the purpose of determining the applicability of subpar. a., the combined design wastewater flow shall include that of any existing POWTS which falls within the parameters of subpar. e.

g. Under subpar. a., the same ownership is defined to be a person, group of persons or a corporation which owns a majority interest in the properties where majority ownership is based upon a majority of the issued voting stock, a majority of the members if no voting stock is issued, a majority of the board of the directors or comparable governing body or participation of each general partner in the profits of a partnership.

(c) Plans and specifications which are required to be submitted for review under sub. (1) shall be one of the following:

1. Signed and sealed in accordance with s. A-E 2.02 by an individual who is registered by the department of regulation and licensing as an architect, engineer, designer of plumbing systems or designer of private sewage systems.

2. Signed, including license number, and dated by an individual who is responsible for the installation of the POWTS and who is credentialed by the department as a licensed master plumber or master plumber-restricted service.

(d) Plans submitted to the department for review shall be accompanied by a fee in accordance with ss. Comm 2.61 and 2.65.

(3) **PLAN REVIEW PROCESS.** (a) **Time limits.** The department shall review and make a determination on the submission of a plan within 15 business days after receiving all the required information and fees.

Note: See appendix for further information regarding the locations of the department's offices where plans may be submitted for review.

(b) **Conditional approval.** 1. If, upon review, the applicable reviewing agency determines that the plans conform to this chapter and chs. Comm 82 and 84, a conditional approval shall be granted in writing.

2. All conditions indicating nonconformance to this chapter and chs. Comm 82 and 84 shall be corrected before or during installation.

(c) **Denial of approval.** If, upon review, the applicable reviewing agency determines that the plans do not conform to this chapter or chs. Comm 82 and 84, the request for conditional approval shall be denied in writing.

(4) REVISIONS. (a) A modification to the design of a POWTS for which a plan has been previously granted approval under sub. (3) (b) shall be submitted to the applicable reviewing agency for review in accordance with this section, if the proposed modification involves any one of the following:

1. The replacement or addition of a POWTS treatment component.
2. The replacement or addition of a POWTS holding component.
3. The replacement or addition of a POWTS dispersal component.
4. A change to one or more dispersal components involving any of the following:
 - a. Location outside suitable evaluated areas or proposed depths.
 - b. Size.
 - c. Orientation.
 - d. Type.

(b) The installer of a POWTS may not implement or undertake the proposed revisions under par. (a) until written approval is obtained from the applicable reviewing agency.

(c) Revisions to previously approved plans shall be reviewed in accordance with sub. (3).

(d) If revisions under par. (a) are submitted to and approved by the department, the owner of the site for the POWTS shall file the revisions with the county which issued the sanitary permit.

(5) LIMITATION OF RESPONSIBILITY. A conditional approval of a plan by the department may not be construed as an assumption by the department of any responsibility for the design of the POWTS or any component of the system. The department does not hold itself liable for any defects in construction, or for any damages that may result from a specific installation.

(6) REVOCATION OF APPROVAL. (a) The department may revoke any plan approval issued under this section for any false statements or misrepresentation of facts on which the approval was based.

(b) The designated agent or governmental unit may revoke any plan approval issued by the designated agent or governmental units for any false statements or misrepresentation of facts on which the approval was based.

(c) The revocation of a plan approval and the reasons for revocation shall be conveyed in writing to the submitter of the plans as noted on the application.

(d) If a plan approval is revoked, the installation or alteration of a POWTS may not continue until another plan approval is obtained.

(7) EVIDENCE OF APPROVAL. (a) When plans are required to be approved by the department or designated agent under sub. (1), the plumber responsible for the installation of a POWTS or the modification of an existing POWTS shall keep at the construction site at least one set of plans bearing evidence of approval by the department or designated agent and at least one copy of specifications.

(b) The plans and specifications shall be maintained at the construction site until the POWTS installation or modification is completed and an opportunity for a final inspection occurs in accordance with s. Comm 83.26.

(c) The plans and specifications shall be made available to the department or the governmental unit upon request.

Comm 83.23 REVIEW AGENT STATUS. (1) Upon request from a governmental unit, the department may delegate to the governmental unit the responsibility to review plans for one or more of the types of POWTS delineated in Table 83.22-2 which are to be or are located within the jurisdiction of that governmental unit.

(2) A request by a governmental unit to review plans for the types of POWTS delineated in Table 83.22-2 shall be made in writing. The request shall include all of the following:

(a) The types of POWTS for which delegation is desired.

(b) Information delineating how the plans are to be processed and reviewed.

(c) Information on how plan review decisions are to be recorded and maintained.

(3) The delegation of plan review by the department shall be contingent upon a governmental unit's request demonstrating sufficient capabilities to complete the reviews, including all of the following:

(a) The employment of one or more individuals who are certified by the department as a POWTS inspector to perform the plan review.

(b) The involvement of one or more individuals, who are certified soil testers, to provide assistance in the plan review process.

Note: The requirements of this subsection do not require the employment of 2 individuals to perform plan review. A single individual who holds a credential as a certified POWTS inspector and as a certified soil tester may fulfill the requirements under pars. (a) and (b).

(4) (a) The department shall provide the governmental unit with a written decision of delegation or denial of delegation relative to a request under this section concerning plan review.

(b) The delegation for plan review shall be contingent upon the governmental unit acknowledging that the submission and review of plans under s. Comm 83.22 (1) may, at the discretion of the submitter, be made to the department or the designated agent.

(5) The department shall include as part of governmental unit audits conducted under s. 145.20 (3) (b), Stats., an evaluation of the plan review functions which are delegated to a governmental unit under this section.

(6) A governmental unit that wishes to discontinue the delegated plan review function under this section shall notify the department in writing at least 30 days prior to the discontinuance.

(7) The recognition as a review agent may be revoked by the department in accordance with s. 145.20 (3) (a) 2., Stats.

Comm 83.24 PETITIONS FOR VARIANCE. (1) The department shall consider and may grant a variance to a provision of this chapter in accordance with ch. Comm 3.

Note: The petition for variance process is to allow the owner of a proposed or existing POWTS to ask the department's recognition of an alternative method or means for complying with the intent of a specific rule.

(2) (a) Pursuant to s. 145.24, Stats., the department may not approve a petition for variance for an existing POWTS which is determined to be a failing private onsite wastewater treatment system.

(b) For the purposes of this subsection, the department shall consider a petition for variance if the existing POWTS is not considered a failing private onsite wastewater treatment system.

Comm 83.25 GOVERNMENTAL PROGRAMS. (1) **DELEGATION OF RESPONSIBILITIES.** (a) Pursuant to s. 145.20 (1) (am), Stats., the delegation by a governmental unit of the administration and enforcement of this chapter to a town sanitary district or public inland lake protection and rehabilitation district shall be by ordinance.

(b) A copy of an ordinance delegating administration and enforcement of this chapter to a town sanitary district or public inland lake protection and rehabilitation district shall be forwarded to the department at least 30 days prior to the effective date of the ordinance.

(2) **ISSUANCE OF BUILDING PERMITS.** (a) **General.** Pursuant to s. 66.036, Stats., the issuance of building permits by a municipality for unsewered properties shall be in accordance with this subsection.

Note: See appendix for a reprint of s. 66.036, Stats.

(b) **New construction.** A municipality may not issue a building permit to commence construction or installation of a structure that necessitates the use of a POWTS to serve the structure, unless:

1. The owner of the property possesses a sanitary permit for the installation of a POWTS in accordance with s. Comm 83.21; or

Note: Section Comm 83.21 outlines the procedures for the issuance of sanitary permits. Sections 145.135 and 145.19, Stats., mandate that no private sewage system may be installed unless the owner of the property holds a valid sanitary permit.

2. A POWTS of adequate capability and capacity to accommodate the wastewater flow and contaminant load already exists to serve the structure.

Note: See ss. Comm 83.02 and 83.03 concerning the application of current code requirements to existing POWTS.

(c) Construction affecting wastewater flow or contaminant load. 1. A municipality may not issue a building permit to commence construction of any addition or alteration to an existing structure when the proposed construction will modify the design wastewater flow or contaminant load, or both, to an existing POWTS, unless the owner of the property:

a. Possesses a sanitary permit to either modify the existing POWTS or construct a POWTS to accommodate the modification in wastewater flow or contaminant load, or both; or

b. Provides documentation to verify that the existing POWTS is sufficient to accommodate the modification in wastewater flow or contaminant load, or both.

2. For the purpose of this paragraph, a modification in wastewater flow or contaminant load shall be considered to occur:

a. For commercial facilities, public buildings, and places of employment, when there is a proposed change in occupancy of the structure; or the proposed modification affects either the type or number of plumbing appliances, fixtures or devices discharging to the system; and

b. For dwellings, when there is an increase or decrease in the number of bedrooms.

(d) Documentation of existing capabilities. Documentation to verify whether an existing POWTS can accommodate a modification in wastewater flow or contaminant load, or both, shall include at least one of the following:

1. A copy of the plan for the existing POWTS that delineates minimum and maximum performance capabilities and which has been previously approved by the department or the governmental unit.

2. Information on the performance capabilities for the existing POWTS that has been recognized through a product approval under ch. Comm 84.

3. A written investigative report prepared by an architect, engineer, designer of plumbing systems, designer of private sewage systems, master plumber, master plumber-restricted service or certified POWTS inspector analyzing the proposed modification and the performance capabilities of the existing POWTS.

(e) Setbacks. 1. A municipality may not issue a building permit for construction of any structure or addition to a structure on a site where there exists a POWTS, unless the proposed construction conforms to the applicable setback limitations under s. Comm 83.43 (9) (i).

2. The applicant for a building permit shall provide documentation to the municipality issuing the building permit showing the location and setback distances for the proposed construction relative to all of the following:

- a. Existing POWTS treatment components.
- b. Existing POWTS holding components.
- c. Existing POWTS dispersal components.

Note: A municipality which issues building permits may delegate to the governmental unit responsible for issuing sanitary permits the determination of whether the proposed construction will affect or interfere with an existing POWTS relating to capability or location of the existing POWTS.

Comm 83.26 INSPECTIONS AND TESTING. (1) (a) Pursuant to s. 145.02 (3) (c), Stats., the department or governmental unit may inspect the construction, installation, operation or maintenance of a POWTS to ascertain whether the POWTS conforms to plans approved by the department or governmental unit, the conditions of approval and this chapter.

(b) The department may issue an order directing an immediate cessation of the installation of a POWTS or the modification to an existing POWTS for failure to comply with a corrective order.

(c) Pursuant to ss. 145.02 (3) (f) and 145.20 (1) (a) and (2) (f), Stats., an individual authorized by the department or a governmental unit to administer and enforce this chapter may issue orders to abate human health hazards relating to this chapter.

Note: Section Comm 5.66 delineates qualifications and responsibilities for POWTS inspectors.

(d) Pursuant to s. 145.20 (2) (e) and (g), Stats., nothing in this chapter shall limit a governmental unit's authority and power to inspect or require an evaluation of a POWTS, including an existing POWTS at times or for activities not covered under this section.

(2) (a) When a sanitary permit is required under s. Comm 83.21 (1), no part of a POWTS component may be covered nor any POWTS component put into service until the governmental unit or the department has had an opportunity to inspect the system in accordance with this subsection.

Note: Pursuant to s. 145.20 (2), Stats., an individual authorized by a governmental unit to administer and enforce the provisions of chs. Comm 82 to 87 relative to POWTS is required to be a certified POWTS inspector under s. Comm 5.66.

(b) The master plumber or the master plumber-restricted service responsible for the installation of a POWTS or the modification to an existing POWTS shall notify the governmental unit when the work will be or is ready for inspection. The notification shall be in person, in writing or by telephone or other electronic communication in a format acceptable to the governmental unit performing the inspection.

(c) The master plumber or the master plumber-restricted service responsible for the installation of a POWTS or the modification shall maintain records of the inspection notifications. The records shall include the date and time of notification and the name of the person contacted.

(d) The master plumber or master plumber-restricted service responsible for the POWTS installation or modification shall provide the necessary equipment and properly credentialed personnel required for the inspection as requested by the governmental unit or department.

(e) If an inspection is not made by the end of the next workday, excluding Saturdays, Sundays, and holidays, after the requested inspection day, the master plumber or the master plumber-restricted service may proceed with the installation of the POWTS, including backfilling and covering.

(3) Pursuant to s. 145.20 (2) (g), Stats., a governmental unit by ordinance may require other inspections in addition to that specified under this section.

(4) A governmental unit shall maintain a written record of each inspection conducted for a POWTS. The record shall include information relative to all of the following:

(a) The location of the POWTS.

(b) The date of the inspection.

(c) The nature and findings of the inspection.

(5) Before being put into service, components of a POWTS shall be tested in accordance with the manufacturer's specifications or as specified as a condition of approval under ss. Comm 83.22 and 84.10.

Comm 83.27 EXPERIMENTAL POWTS. (1) The provisions of this chapter or ch. Comm 84 are not intended to prevent the design and use of an innovative method or concept for the treatment or dispersal of domestic wastewater by means of an experimental method which is not specifically addressed by this chapter, provided the design has been first approved by the department in accordance with s. Comm 84.50 (3).

(2) The department shall review a submittal of an experimental POWTS under this section with input from the technical advisory committee created under s. Comm 84.10 (3) (d).

Comm 83.28 PENALTIES. Penalties for violations of this chapter shall be assessed in accordance with s. 145.12, Stats.

Note: Section 145.12 (4), Stats., indicates that any person who violates any order under s. 145.02 (3) (f) or 145.20 (2) (f) or any rule or standard adopted under s. 145.13 shall forfeit not less than \$10 nor more than \$1,000 for each violation. Each violation of an order under s. 145.02 (3) (f) or 145.20 (2) (f) or any rule or standard adopted under s. 145.13 constitutes a separate offense and each day of continued violation is a separate offense.

Comm 83.29 RANGE OF RESPONSES. (1) (a) Pursuant to s. 160.21, Stats., the department may respond with any one or more of the actions delineated under Table 83.29 if the preventive action limits or enforcement standards enumerated in ch. NR 140 Tables 1 and 2 are exceeded at a point of standards application as a result of the performance of a POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], except as provided in par. (b).

(b) Pursuant to s. 160.255, Stats., the design, installation, use or maintenance of a POWTS is not required to comply with the nitrate standard specified in ch. NR 140 Table 1, except as provided under s. Comm 83.03 (5).

Table 83.29
DEPARTMENT RANGE OF RESPONSES

-
- Gather more data relative to the cause and significance of the exceedence.
 - Determine whether the situation is a human health hazard.
 - Issue orders to change or comply with the management or maintenance plan of a specific POWTS or type of onsite wastewater system.
 - Issue orders to conform with this chapter, including the prohibition of an activity or practice.
 - Determine whether the exceedence is an isolated problem, or is likely to recur.
 - Revise or revoke a product approval issued under ch. Comm 84 for a treatment or dispersal component.
 - Revise the rules of this chapter or chs. Comm 81, 82, 84 or 85.
-

(2) Pursuant to s. 160.21 (2), Stats., the point of standards application relative to the performance of POWTS shall be:

- (a) Any point of present groundwater use for potable water supply; and
- (b) Any point beyond the boundary of the property on which the facility, practice or activity is located.

Subchapter III GENERAL REQUIREMENTS

Comm 83.30 PURPOSE. This subchapter establishes parameters for the types of POWTS that may be used and how a POWTS may be used.

Comm 83.31 PRINCIPLES. A POWTS shall be operated and used in such a manner so as not to render the POWTS inoperative or beyond its capabilities, and thereby, create a human health hazard.

Comm 83.32 PROHIBITIONS AND LIMITATIONS. (1) PROHIBITIONS. (a) Except as provided in s. Comm 83.03 (4), the introduction of wastewater or substances in such quantities or concentrations to a POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], that results in exceeding the enforcement standards and preventive action limits specified in ch. NR 140 Tables 1 and 2 at a point of standards application shall be prohibited.

Note: Comm 83.03 (4) reads: (4) GROUNDWATER STANDARDS. (a) Pursuant to s. 160.255, Stats., the design, installation, use or maintenance of a POWTS is not required to comply with the nitrate standard specified in ch. NR 140 Table 1, except as provided under sub. (5).

(b) Pursuant to s. 160.19 (2) (a), Stats., the department has determined that it is not technically or economically feasible to require that a POWTS treat wastewater to comply with the preventive action limit for chloride specified in ch. NR 140, Table 2, as existed on June 1, 1998.

(c) Substances deleterious to a POWTS shall be intercepted, diluted or treated in accordance with s. Comm 82.34 prior to the substance discharging into a POWTS.

(d) The use of a cesspool as a POWTS is prohibited, including any cesspool existing prior to [the effective date of this chapter . . . revisor to insert effective date].

(e) The discharge of domestic wastewater or effluent to the surface waters of the state is prohibited, including by means of plumbing outfall pipes existing prior to [the effective date of this chapter . . . revisor to insert effective date].

(f) The discharge of domestic wastewater or effluent to the ground surface is prohibited, including by means of plumbing outfall pipes existing prior to [the effective date of this chapter . . . revisor to insert effective date].

(g) The infiltrative surface of a treatment or dispersal component of a POWTS existing prior to December 1, 1969, which consists in part of in situ soil may not be located in bedrock or groundwater.

(h) The use of camping unit transfer containers as a POWTS holding component shall be restricted to campgrounds permitted by the department of health and family services under ch. HFS 178.

(2) **LOCAL PROHIBITIONS.** (a) A municipality may by ordinance prohibit or limit the installation and use of the following technologies, designs or methods as POWTS components:

1. A holding tank.
2. A constructed wetland as a POWTS treatment component.
3. Evapotranspiration bed as a POWTS treatment component.

(b) A municipality may enact ordinances that are more restrictive than the applicable state minimum standards for those POWTS existing prior to December 1, 1972, except as provided in s. Comm 83.03 (2) (b) 2.

Note: The date, December 1, 1972, reflects the point in time at which the state plumbing code became a state-wide uniformly applied code rather than just a minimum standard. Since December 1, 1969 to [the effective date of this chapter . . . revisor to insert effective date], the state plumbing code required 36 inches of soil between the infiltrative surface of a POWTS and high groundwater or bedrock.

(c) A municipality may by ordinance restrict the ownership of a POWTS to a governmental entity or agency when the POWTS is to serve 2 or more structures or buildings that are located on more than one property.

(3) **LIMITATIONS.** (a) Industrial wastes and wastewater may not, unless approved by the department of natural resources, be introduced into a plumbing drain system that is served by a POWTS.

Note: The department of natural resources regulates industrial wastes under ch. NR 214. Section NR 214.02 reads in part: "This chapter applies to those discharges of industrial wastes to land treatment systems not regulated under ch. NR 518. This includes but is not limited to liquid wastes, by-product solids and sludges generated by: fruit and vegetable processing, dairy products processing, meat, fish and poultry products processing, mink raising operations, aquaculture, commercial laundromat and motor vehicle cleaning operations and any other industrial, commercial or agricultural operation which results in a point source discharge that has no detrimental effects on the soils, vegetation or groundwater of a land treatment system".

(b) Storm and clear water wastes may be introduced into a plumbing drain system that is served by a POWTS, if the POWTS is designed to accept those wastes. A POWTS may accept wastes permitted under s. Comm 82.36 (3) (b).

Note: Section Comm 82.36 (3) (b) 4. permits the discharge of a maximum of 20 gallons per day of clear water wastes to a sanitary drain system connected to a publicly owned treatment works.

(c) Except as provided in ch. NR 116, no part of a POWTS may be installed in a floodway.

Note: See s. Comm 83.45 (6) for installations in a floodfringe.

Comm 83.33 ABANDONMENT. A subsurface tank or pit that is no longer used as a POWTS component shall be abandoned by complying with all of the following:

- (1) Disconnecting all piping to the tanks and pits.
- (2) Sealing all disconnected piping to the tanks and pits in accordance with s. Comm 82.21 (2) (d).
- (3) Pumping and disposing of the contents from all tanks and pits.

Note: The disposal of the contents from treatment tanks, distribution tanks, seepage pits and holding components is addressed in ch. NR 113 which is administered by the department of natural resources.

- (4) Removing all tanks or removing the covers of the tanks or pits and filling the tanks and pits with soil, gravel or an inert solid material.

Note: Pursuant to s. 281.45, Stats., municipalities and sanitary districts may determine the availability of, and require connection to, public sewers. Section 281.45, Stats., reads in part: "HOUSE CONNECTIONS. To assure preservation of public health, comfort and safety, any city village or town or town sanitary district having a system of waterworks or sewerage, or both, may by ordinance require buildings used for human habitation and located adjacent to a sewer or water main, or in a block through which one or both of these systems extend, to be connected with either or both in the manner prescribed. If any person fails to comply for more than 10 days after notice in writing the municipality may impose a penalty or may cause connection to be made, and the expense thereof shall be assessed as a special tax against the property."

Subchapter IV DESIGN AND INSTALLATION

Comm 83.40 PURPOSE. This subchapter establishes minimum parameters for the design and installation of a POWTS for the purpose of:

- (1) Safeguarding public health;
- (2) Minimizing the level of substances which have a reasonable probability of entering waters of the state; and
- (3) Delineating performance standards by which to evaluate designs.

Comm 83.41 PRINCIPLES. (1) A POWTS shall be designed to hold wastewater or reduce the contaminant load and disperse the flow of wastewater as specified in this subchapter.

(2) A POWTS shall be designed to have sufficient capacity to accommodate the anticipated quantities of wastewater that will be discharged into the system.

(3) A POWTS shall be designed to have sufficient ability to treat or separate out the anticipated types, quantities and concentrations of wastewater contaminants to be discharged into the system so that the dispersed wastewater will not create a human health hazard.

(4) A POWTS shall be designed to disperse wastewater below the surface of the ground.

Comm 83.42 APPLICATION. (1) **DESIGN BASIS.** The design of a POWTS shall be based on the methods and limitations outlined in this subchapter or on other documented data acceptable to the department.

(2) **DESIGN RELATION TO ACTUAL FLOWS AND CONTAMINANT LOADS.** For any situation where it is known that the wastewater flow or contaminant load exceeds the parameters of this subchapter, the POWTS shall be designed in relation to the known flow or load.

(3) **DESIGN CONSIDERATIONS.** The evidence to support assertions relative to contaminant reduction and hydraulic dispersal shall include at least all of the following:

- (a) The flow and contaminant load of the influent wastewater.
- (b) The ability of all components to reduce contaminant load and disperse hydraulic flow into the environment.
- (c) The flow velocities and friction losses throughout the system based upon accepted engineering practice.

Comm 83.43 GENERAL REQUIREMENTS. (1) **MATERIALS.** The components of a POWTS shall be constructed of materials and products that are of a type recognized under this chapter or ch. Comm 84.

(2) **DESIGN FLOW.** In order to accommodate peak wastewater flow, the design wastewater flow of a POWTS shall equal at least 150% of the estimated daily flow generated from a dwelling, building or facility.

(3) **ESTIMATED DAILY COMBINED FLOW FOR A POWTS SERVING A DWELLING.** The estimated daily wastewater flow of combined graywater, clear water and blackwater from a dwelling shall be based on one or more of the following:

(a) The following equation:

$$100 \text{ gallons} \times B = F$$

Where: B = number of bedrooms, based on 2 persons per bedroom, unless otherwise approved by the department.

F = Estimated daily wastewater flow per dwelling per day (in gallons), excluding storm water discharges.

(b) A detailed estimate of wastewater flow based upon per capita or per function.

(4) **ESTIMATED DAILY SEGREGATED GRAYWATER FLOW FOR A POWTS SERVING A DWELLING.** The estimated daily wastewater flow of graywater and clear water from a dwelling shall be based on one or more of the following:

(a) The following equation:

$$60 \text{ gallons} \times B = F$$

Where: B = number of bedrooms, based on 2 persons per bedroom, unless otherwise approved by the department.

F = Estimated daily graywater flow per dwelling per day (in gallons), excluding storm water discharges.

(b) A detailed estimate of graywater flow based upon per capita or per function.

(5) **ESTIMATING SEGREGATED BLACKWATER FLOW FOR A POWTS SERVING A DWELLING.** The estimated daily wastewater flow of blackwater from a dwelling shall be based on one or more of the following:

(a) The following equation:

$$40 \text{ gallons} \times B = F$$

Where: B = number of bedrooms, based on 2 persons per bedroom, unless otherwise approved by the department.

F = Estimated daily blackwater flow per dwelling per day (in gallons).

(b) A detailed estimate of blackwater flow based upon per capita or per function.

(6) ESTIMATING WASTEWATER FLOW FOR COMMERCIAL FACILITIES. The estimated daily wastewater flow of graywater, blackwater, or combined graywater-blackwater flow from commercial facilities shall be based on one or more of the following:

(a) Measured daily wastewater flow over a period of time representative of the facility's use or occupancy.

(b) A detailed estimate of wastewater flow based upon per capita or per function.

Note: See appendix for further information.

(7) ESTIMATING CONTAMINANT LOADS. Estimates of contaminant loads from dwellings and public facilities shall be based on a detailed analysis including all contaminants listed in sub. (8) and s. Comm 83.44 (2) (a).

Note 1: See appendix for further information.

Note 2: See Note under s. Comm 83.32 (2) for information relative to industrial wastes.

(8) FINAL EFFLUENT QUALITY. (a) The wastewater quality dispersed from the last POWTS treatment or dispersal component consisting in part of in situ soil shall contain fecal coliform of less than either of the following.

1. 200 CFU per 100 ml, based upon a monthly geometric mean.

2. 200 MPN per gram of dry soil, based upon a monthly geometric mean.

Note: "CFU" means colony forming unit. "MPN" means most probable number. The two types of measurement reflect the sampling of a liquid and a dry material and do not represent a correlation between the two.

(b) The monthly geometric mean under par. (a) shall be determined on the basis of measurements taken over 30 consecutive days, with at least 6 measurements occurring on 6 separate days.

(9) GENERAL DESIGN REQUIREMENTS. (a) Flow velocity. 1. Piping within a POWTS shall be designed and installed to supply wastewater to POWTS treatment and dispersal components while maintaining the velocity required to ensure operation of the POWTS.

2. Gravity flow piping between POWTS components shall be installed at a pitch that produces a computed flow velocity of at least one foot per second when flowing half full.

3. Pressurization equipment or devices and piping to be utilized upstream of a POWTS treatment or dispersal component consisting in part of in situ soil shall be designed and installed to produce a computed velocity of at least 2 feet per second.

4. Gravity piping within a POWTS treatment or dispersal component consisting in part of in situ soil shall be installed level or pitched downstream a maximum 4 inches per 100 feet.

(b) Distribution and drain pipe sizing. The piping within a POWTS shall be of a diameter to permit the operation of the POWTS.

(c) Frost protection. All POWTS components shall be protected from freezing temperatures that could detrimentally affect component operation.

(d) Component placement. The orientation of a POWTS treatment or dispersal component consisting in part of in situ soil shall take into account variations in elevation, slope orientation, and other conditions that could affect component performance.

(e) Alarms or warning systems. 1. a. A POWTS component utilizing a mechanical device to treat wastewater or to distribute effluent shall be provided with an automatic visual or audible means of notifying the user of the POWTS of a mechanical device failure in accordance with this subdivision.

Note: In accordance with s. Comm 16.28, an alarm that is electrically powered is to be on a separate circuit from the circuit supplying power to the mechanical device.

b. An alarm indicating the failure of a pump shall remain audible or visible until manually turned off.

c. Where duplex pumping equipment is employed to provide continuous component operation in the event that one pump fails, the pumps shall be installed in such a manner so as to provide the continuous operation automatically.

2. A POWTS holding tank shall be provided with an automatic visual or audible means of notifying the user of the POWTS of the necessity for pumping.

(f) Accessibility. The design of a POWTS shall include provisions to provide access to all components that require maintenance or observation.

(g) Anchoring system components. An exterior subsurface POWTS treatment tank or POWTS holding component to be installed in an area subject to saturated conditions shall be installed so as to prevent flotation of the tank or component.

Note: See appendix for further information.

(h) Treatment byproducts. 1. All treatment byproducts discharged from or as a result of operating a POWTS shall be disposed of so as not to create a human health hazard.

Note: The disposal of the contents of holding tanks and the sludge, scum, and contaminated liquids from treatment tanks and components is regulated by the department of natural resources under chs. NR 113 and NR 204.

2. Deleterious or hazardous materials segregated out from effluent flows shall be disposed of in a manner conforming with the rules of the state agency having jurisdiction.

3. Effluent from a POWTS shall be dispersed so as not to create a human health hazard.

4. All POWTS components within a building or structure shall be gas tight unless provisions are made assuring the safety of individuals entering the building or structure.

(i) Site parameters and limitations. POWTS treatment, holding and dispersal components shall be located so as to provide the minimum horizontal setback distances as outlined in Table 83.43-1 or as otherwise approved by the department.

Note: Chapter NR 812 establishes upslope location criteria for wells relative to contamination sources.

**Table 83.43-1
HORIZONTAL SETBACK PARAMETERS**

Physical Feature	POWTS Treatment Component Consisting in Part of In Situ Soil or Dispersal Component	Exterior Subsurface Treatment Tank or Holding Tank Component	Servicing, Suction Lines and Pump Discharge Lines
Building	10 feet	5 feet ^a	5 feet ^a
Property Line	5 feet	2 feet	2 feet
Swimming Pool	15 feet	none ^b	none ^b
OHWL of Navigable Waters	50 feet	10 feet	10 feet
Water Service and Private Water Main	10 feet	10 feet	10 feet
Well	chs. NR 811 & 812 ^c	chs. NR 811 & 812 ^c	chs. NR 811 & 812 ^c

OHWL = Ordinary High-Water Mark

Note a: Except camping unit transfer containers

Note b: See s. Comm 84.43 (9) (f) relative to accessibility.

Note c: Portions of chs. NR 811 & 812 are reprinted in the appendix.

Note: The Department of Transportation under s. Trans 233.08 establishes setback limits from the centerline of state trunk highways or connecting highways to structures and improvements which include septic systems.

(j) Service suction and discharge lines. 1. A suction line or discharge line serving a holding tank for servicing purposes shall comply with all of the following:

a. A pipe serving as the suction or discharge line shall be of an acceptable type in accordance with ch. Comm 84.

b. A suction or discharge line shall terminate with a service port consisting of a quick disconnect fitting with a removable plug.

c. The service port of a suction or discharge line shall terminate at least 2 feet above final grade.

d. The service port of a suction or discharge line shall be identified as such with a permanent sign with lettering at least $\frac{1}{2}$ inch in height.

e. The service port of a suction or discharge line shall be secured to a permanent support that is capable of withstanding the loads and forces placed on the port.

f. A suction or discharge line shall be at least 3 inches in diameter.

2. A suction line serving a holding tank may not be installed in such a manner or arrangement that the tank can be drained by gravity or siphonic action.

3. Where a lift station is employed for servicing a holding tank, the pump discharge line shall conform with subd. 1, except as provided in subpars. a. and b.

a. A discharge line from the lift station shall be at least 2 inches in diameter.

b. The lift station pump shall be activated by means of a keyed-switch at the service port.

Comm 83.44 PARAMETERS FOR POWTS COMPONENTS CONSISTING OF IN SITU SOIL. (1) EVALUATION. POWTS treatment and dispersal components consisting in part of in situ soil shall be evaluated in accordance with ch. Comm 85.

(2) INFLUENT QUALITY. (a) Influent quality to a POWTS treatment or dispersal component consisting in part of in situ soil shall be equal to or less than all of the following:

1. A monthly average of 30 mg/L fats, oil and grease.

2. A monthly average of 220 mg/L BOD₅.

3. A monthly average of 150 mg/L TSS.

(b) The monthly average under par. (a) shall be calculated as the sum of all measurements taken over 30 consecutive days, with at least 6 measurements occurring on 6 separate days, and divided by the number of measurements taken during that period.

(c) Influent to a POWTS treatment or dispersal component that consists in part of in situ soil may not contain any solid or suspended solid exceeding $\frac{1}{8}$ inch in diameter.

(3) INFILTRATIVE SURFACE. (a) The infiltrative surface of a POWTS treatment component consisting in part of in situ soil or dispersal component shall be located at least 12 inches above the estimated highest groundwater elevation and bedrock.

(b) 1. At least 6 inches of the 12-inch soil separation required under subpar. a. shall be an in situ soil type for which soil treatment capability has been credited under Table 83.44-3.

2. The purpose of the 6 inches of in situ soil under subd. 1. shall be to assure that the effluent will be assimilated into subsurface soils without ponding on the ground surface.

(c) The infiltrative surface of a POWTS treatment component consisting in part of in situ soil or dispersal component shall be located at least one inch below the finished grade.

(4) CAPABILITIES. (a) 1. a. Except as provided under subd. 2, the dispersal capability of a POWTS treatment or dispersal component consisting in part of in situ soil shall be limited to that specified in Table 83.44-1 or Table 83.44-2 based upon the effluent quality concentrations being applied.

b. Under subpar. a. the effluent quality parameter with the highest concentration shall determine the maximum application rate.

c. Except as provided in par. (c), the soil conditions at the infiltrative surface of the POWTS treatment or dispersal component consisting in part of in situ soil shall be used to establish the maximum application rate for a POWTS dispersal design.

d. The moist soil consistence of the soil horizon in which the infiltrative surface of a POWTS treatment or dispersal component will be located may not be stronger than firm or any cemented classification.

e. The application rates specified under Table 83.44-1 shall only be recognized where the percolation results have been filed with the governmental unit before July 2, 1994.

2. Maximum soil application rates other than those specified in Tables 83.44-1 or 83.44-2 may be employed for the design of a POWTS treatment or dispersal component consisting in part of in situ soil if documentation is submitted and approved under s. Comm 83.22 and is based on soil permeability and evapotranspiration estimates correlated to specific soil characteristics described in a detailed morphological soil evaluation.

(b) The treatment capability of a POWTS treatment component consisting in part of in situ soil shall be limited to that specified in Table 83.44-3, unless otherwise approved by the department.

(c) The design of a treatment or dispersal component consisting in part of situ soil shall reflect restrictive soil horizons that affect treatment or dispersal.

(5) EFFLUENT DISTRIBUTION. (a) The distribution of effluent to silt loam or finer soil material with weak platy or massive structure shall be accomplished by means of pressurized distribution.

(b) The distribution of effluent to in situ soil shall be accomplished by means of pressurized distribution, if the quality of the effluent is equal to or less than all of the following:

1. A monthly average of 30mg/L BOD₅.
2. A monthly average of 30mg/L TSS.
3. A monthly geometric mean of 10⁴ fecal coliform cfu per 100 ml.

Note: "CFU" mean colony forming units.

(c) No dose of effluent to in situ soil by means of pressurized distribution may be less than 5 times the void volume of the POWTS distribution laterals.

Table 83.44-1
MAXIMUM SOIL APPLICATION RATES
BASED UPON PERCOLATION RATES

Percolation Rate (minutes per inch)	Maximum Monthly Average BOD ₅ > 30 mg/L < 220 mg/L TSS > 30 mg/L ≤ 150 mg/L (gals/sq ft/day)	Maximum Monthly Average BOD ₅ ≤ 30 mg/L TSS ≤ 30 mg/L (gals/sq ft/day)
0 to less than 10	0.7	1.2
10 to less than 30	0.6	0.9
30 to less than 45	0.5	0.7
45 to less than 60	0.3	0.5
60 to 120	0.2	0.3
greater than 120	0.0	0.0

Note: > means greater than
 ≤ means less than or equal to

Table 83.44-2
MAXIMUM SOIL APPLICATION RATES
BASED UPON MORPHOLOGICAL SOIL EVALUATIONS

Soil Texture	Soil Structure	Maximum Monthly Average	
		BOD ₅ > 30 < 220mg/L TSS > 30 ≤ 150mg/L (gals/sq ft/day)	BOD ₅ ≤ 30 mg/L TSS ≤ 30 mg/L (gals/sq ft/day)
Coarse sand or coarser	N/A	0.7	1.6
Loamy coarse sand	N/A	0.7	1.4
Sand	N/A	0.7	1.2
Loamy sand	Weak to strong	0.7	1.2
Loamy sand	Massive	0.5	0.7
Fine sand	Moderate or strong	0.5	0.9
Fine sand	Massive or weak	0.4	0.6
Loamy fine sand	Moderate or strong	0.5	0.9
Loamy fine sand	Massive or weak	0.4	0.6
Very fine sand	N/A	0.4	0.6
Loamy very fine sand	N/A	0.4	0.6
Sandy loam	Moderate to strong	0.5	0.9
Sandy loam	Weak, weak platy	0.4	0.6

Table 83.44-2 continued

Soil Texture	Soil Structure	Maximum Monthly Average	
		BOD ₅ > 30 ≤ 220mg/L TSS > 30 ≤ 150mg/L (gals/sq ft/day)	BOD ₅ ≤ 30 mg/L TSS ≤ 30 mg/L (gals/sq ft/day)
Sandy loam	Massive	0.3	0.5
Loam	Moderate or strong	0.5	0.8
Loam	Weak, weak platy	0.4	0.6
Loam	Massive	0.3	0.5
Silt loam	Moderate or strong	0.5	0.8
Silt loam	Weak, weak platy	0.2	0.3
Silt loam	Massive	0.0	0.2
Sandy clay loam	Moderate or strong	0.4	0.6
Sandy clay loam	Weak, weak platy	0.2	0.3
Sandy clay loam	Massive	0.0	0.0
Clay loam	Moderate or strong	0.4	0.6
Clay loam	Weak, weak platy	0.2	0.3
Clay loam	Massive	0.0	0.0
Silty clay loam	Moderate or strong	0.4	0.6
Silty clay loam	Weak, weak platy	0.2	0.3
Silty clay loam	Massive	0.0	0.0
Sandy clay	Moderate or strong	0.2	0.3
Sandy clay	Massive or weak	0.0	0.0
Clay	Moderate or strong	0.2	0.3
Clay	Massive or weak	0.0	0.0
Silty clay	Moderate or strong	0.2	0.3
Silty clay	Massive or weak	0.0	0.0

Note: > means greater than
 ≤ means less than or equal to
 N/A means Not Applicable

Table 83.44-3
SOIL TREATMENT CAPABILITY FOR FECAL COLIFORM
Minimum Depth of Unsaturated Soil Required to
Attain Level in s. Comm 83.43 (8)^a
(in inches)

Soil Texture	Soil Structure	Fecal Coliform ^b >10 ⁴ cfu/100ml	Fecal Coliform ^b >10 ³ to <10 ⁴ cfu/100ml	Fecal Coliform ^b ≤10 ³ cfu/100ml
Very coarse sand or coarser	N/A ^c	120	60	30
Coarse sand	N/A ^c	60	36	24
Loamy coarse sand (w/ ≤35% coarse fragments)	N/A ^c	60	36	24
Loamy coarse sand (w/ >35% to ≤60% coarse fragments)	N/A ^c	120	60	30
Loamy coarse sand (w/ >60% coarse fragments)	N/A ^c	NC	NC	NC
Sand (w/ ≤35% coarse fragments)	N/A ^c	36	24	12
Sand (w/ >35% to ≤60% coarse fragments)	N/A ^c	120	60	30
Sand (w/ >60% coarse fragments)	N/A ^c	NC	NC	NC
Loamy sand	N/A ^c	36	24	12
Fine sand	Moderate or strong	36	24	12
Fine sand	Massive or Weak	36	24	12
Loamy fine sand	Moderate or strong	36	24	12
Loamy fine sand	Massive or Weak	36	24	12
Very fine sand	N/A ^c	36	24	12
Loamy very fine sand	N/A ^c	36	24	12
Sandy loam	Moderate or strong	36	24	12
Sandy loam	Weak, weak platy	36	24	12
Sandy loam	Massive	36	24	12
Loam	Moderate or strong	36	24	12
Loam	Weak, weak platy	36	24	12
Loam	Massive	36	24	12
Silt loam	Moderate or strong	36	24	12
Silt loam	Weak, weak platy	36	24	12
Silt loam	Massive	36	24	12
Sandy clay loam	Moderate or strong	36	24	12
Sandy clay loam	Weak, weak platy	36	24	12
Sandy clay loam	Massive	36	24	12
Clay loam	Moderate or strong	36	24	12
Clay loam	Weak, weak platy	36	24	12
Clay loam	Massive	36	24	12
Silty clay loam	Moderate or strong	36	24	12
Silty clay loam	Weak, weak platy	36	24	12
Silty clay loam	Massive	36	24	12

Table 83.44-3 continued

Soil Texture	Soil Structure	Fecal Coliform >10 ⁴ cfu/100ml	Fecal Coliform >10 ³ to ≤10 ⁴ cfu/100ml	Fecal Coliform ≤10 ³ cfu/100ml
Sandy clay	Moderate or strong	36	24	12
Sandy clay	Massive or weak	36	24	12
Clay	Moderate or strong	36	24	12
Clay	Massive or weak	36	24	12
Silty clay	Moderate or strong	36	24	12
Silty clay	Massive or weak	36	24	12

Note a: Influent quality as per s. Comm 83.44 (2)

Note b: Fecal coliform is determined as a monthly geometric mean in accordance with s. Comm 83.43 (8) (b).

Note c: Structure will not affect performance

N/A means Not Applicable

NC means No Credit

< means less than or equal to

> means great than

(6) ORIENTATION. (a) 1. The infiltrative surface of a distribution cell within a POWTS treatment or dispersal component consisting in part of in situ soil and located in fill material above original grade shall be level.

2. The longest dimension of a POWTS treatment or dispersal component consisting in part of in situ soil shall be oriented along the contour of the component site location unless otherwise approved by the department.

Note: See appendix for an illustration depicting a distribution cell.

(b) The infiltrative surface of a distribution cell within a POWTS treatment or dispersal component consisting in part of in situ soil and located below the surface of the original grade shall be level.

(7) GEOMETRY. The geometry of a subsurface treatment or dispersal component consisting in part of the in situ soil shall take into account linear loading rates that are based on soil texture, structure, consistence and distance to seasonal soil saturation and restrictive soil horizons.

Comm 83.45 INSTALLATION. (1) GENERAL. A POWTS shall be constructed and installed in such a manner to hold wastewater or reduce the contaminant load and disperse the flow of wastewater in accordance with this subchapter and the plan approval under s. Comm 83.22.

(2) FROZEN SOIL. POWTS treatment and dispersal components consisting in part of in situ soil may not be installed if the soil is frozen at the infiltrative surface of the component.

(3) SNOW COVER. Snow cover shall be removed before excavating or installing POWTS treatment and dispersal components consisting in part of in situ soil.

(4) **MOISTURE.** The soil moisture content for a POWTS treatment or dispersal component consisting in part of in situ soil shall be evaluated immediately prior to installation of the component. If the soil at the infiltrative surface can be rolled into a 1/4-inch wire, the installation may not proceed.

(5) **BEDDING.** All vessels and pipes of a POWTS shall be bedded in accordance with a product approval under s. Comm 84.10 or a plan approval under s. Comm 83.22.

(6) **FLOOD FRINGE.** (a) All POWTS treatment tanks, holding and dispersal tanks that are located in flood fringe areas shall be made and maintained watertight to prevent infiltration.

(b) Vent pipes and observation pipes serving POWTS components that are located in flood fringe areas shall terminate at least 2 feet above regional flood levels.

Note: See s. Comm 83.43 (9) (g) relative to anchoring provisions.

Subchapter V MANAGEMENT

Comm 83.50 PURPOSE. The purpose of this subchapter is to:

- (1) Establish monitoring and maintenance requirements for POWTS in order to ensure that POWTS will operate as designed and thereby protect the public health and the waters of the state; and
- (2) Provide the department with data by which to make regulatory decisions.

Comm 83.51 PRINCIPLES. (1) A POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], shall be maintained at all times so as not to create a human health hazard.

(2) When upon inspection of a POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], any part of the system that is found to be defective in conformance with the applicable provisions of this chapter, the installation or modification plan, or the approvals, the part shall be repaired, renovated, replaced or removed.

Note: Section Comm 87.60 (5) (b) 4 also establishes management and maintenance requirements for a POWTS that is located in a governmental unit which participates in the replacement and rehabilitation program under s. 145.245, Stats.

Comm 83.52 RESPONSIBILITIES. (1) (a) The owner of a POWTS shall be responsible for operating and maintaining the POWTS in accordance with this chapter and the approved management plan under s. Comm 83.54 (1).

(b) The owner of a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], shall be responsible for maintaining the POWTS in accordance with s. Comm 83.54 (4).

(2) A POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], that is not maintained in accordance with the approved management plan or as required under s. Comm 83.54 (4) shall be considered a human health hazard.

(3) The activities relating to evaluating and monitoring mechanical POWTS components after the initial installation of the POWTS in accordance with an approved management plan shall be conducted by person who holds a credential issued by the department as a registered mechanical POWTS maintainer.

Note: See s. Comm 5.36 concerning the application and qualification requirements to become a registered mechanical POWTS maintainer.

Comm 83.53 GENERAL. (1) No product for chemical or physical restoration or chemical or physical procedures for POWTS, including a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], may be used unless approved by the department in accordance with ss. Comm 84.10 and 84.13.

(2) Nothing in this subchapter shall limit a governmental unit's authority and power in establishing a mandatory POWTS maintenance program, including management or maintenance undertaken by the governmental unit.

Comm 83.54 MANAGEMENT REQUIREMENTS. (1) MANAGEMENT PLAN. (a) The management plan for each POWTS shall include information and procedures for maintaining the POWTS to operate and function within the standards of this chapter and as designed and approved.

(b) The management plan for a POWTS shall be a part of the plan submittal under s. Comm 83.22 or 84.10.

(c) The management plan for POWTS shall specify all necessary management and servicing information which may include, but is not limited to all of the following:

1. Accumulated solids or byproduct removal requirements.
2. Influent quantities and qualities and effluent quantities and qualities.
3. Metering, sampling and monitoring schedules and requirements.
4. Load and rest schedules.
5. Pumping frequency requirements.
6. Installation and inspection checklists.
7. Evaluation, monitoring and maintenance schedules for mechanical POWTS components.
8. Start up and shutdown procedures.
9. Procedure for abandonment.

(d) If the owner of the POWTS wishes to operate or maintain a POWTS differently than that specified in the approved management plan, a written request for approval to amend the management plan shall be submitted to the agency that initially reviewed the installation plan under s. Comm 83.22.

(2) METERING AND MONITORING. (a) General. The management plan specified in sub. (1) shall include the metering or monitoring of POWTS influent or effluent as specified in this subsection.

(b) Department option. The department may require the metering or monitoring of any POWTS to evaluate the operation of the POWTS.

(c) Required influent metering. Influent flow meters shall be installed in accordance with par. (d), if a POWTS:

1. Includes one or more holding tanks, except camping unit transfer containers;
2. Receives wastewater of a type exceeding the quality limits in s. Comm 83.44 (2), except from one- and 2-family dwellings; or
3. Is required by a POWTS component manufacturer.

(d) Metering influent flows. 1. Influent flows to POWTS shall be metered by one of the following methods:

- a. Installing event counters and elapsed time meters.
- b. Installing water meters to meter the water distribution system flow to the POWTS.
- c. Metering wastewater flow from all parts of the plumbing system discharging to the POWTS.
- d. Metering the water distribution system and metering exterior hydrant use, except as provided in subd. 2.

2. Where meters are installed on water distribution systems existing prior to [the effective date of this chapter . . . revisor to insert effective date], the entire water distribution system may be metered and the exterior hydrant usage estimated and subtracted from the total flow to meet the requirements of this paragraph.

(e) Monitoring influent and effluent loads. 1. When and where the monitoring of groundwater is required, groundwater monitoring wells constructed in accordance with ch. NR 141 shall be utilized.

2. When influent or effluent contaminants are to be monitored, samples shall be collected in accordance with the requirements of the approved management plan or, where no procedures are specified, in accordance with published sampling procedures accepted by the department.

Note: Acceptable sampling procedures include those contained in the following sources:

"Procedures Manual for Ground Water Monitoring at Solid Waste Disposal Sites" EPA SW-611, Office of Water and Waste Management, U. S. Environmental Protection Agency, Dec. 1980, Washington, D. C.

"Techniques of Water Resources Investigations of the United States Geological Survey, Guidelines for Collection and Field Analysis of Ground Water Samples for Selected Unstable Constituents," Book I, Chapter D2, U. S. Geological Survey, Washington, D. C.

"Procedures for the Collection of Representative Water Quality Data from Monitoring Wells," Cooperative Groundwater Report 7, Illinois State Water Survey, 1981, Champaign, Illinois.

"Manual of Ground Water Sampling Procedures," NWWA/EPA Series, Robert S. Kerr Environmental Research Laboratory, 1981, Ada, Oklahoma.

"Groundwater Sampling Procedures Guidelines", Wisconsin DNR, PUBL-WR-153, February 1987.

"Groundwater Sampling Procedures Field Manual", Wisconsin DNR, PUBL-WR-168, September 1987.

3. All groundwater samples collected to evaluate influent or effluent quality, except samples collected for total coliform bacteria analysis and the field analyses for pH, specific conductance and temperature, shall be analyzed by a laboratory certified under s. 299.11, Stats., and rules adopted under that section.

4. The results of the analysis required under subd. 2. shall be maintained and reported as required in the approved management plan and in accordance with s. Comm 83.55 (1) (a).

(3) SERVICING REQUIREMENTS. (a) The management plan specified in sub. (1) shall reflect the servicing schedules of POWTS components as specified in this subsection.

(b) The pumping frequency of an anaerobic treatment tank for a POWTS shall occur at least when the combined sludge and scum volume equals $\frac{1}{3}$ of the tank volume.

(c) The pumping frequency of a holding tank for a POWTS, except for camping unit transfer containers, shall occur at least when the wastewater of the tank reaches a level of one foot below the inlet invert of the tank.

Note: The pumping of POWTS holding and treatment components, including septic tanks and holding tanks, is required to be performed by licensed pumpers under chs. NR 113 and NR 114.

(4) EXISTING POWTS. (a) The pumping frequency of an anaerobic treatment tank for a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date] shall occur at least when the combined sludge and scum volume equals $\frac{1}{3}$ of the tank volume.

(b) The pumping of a holding tank for a POWTS existing prior to [the effective date of this chapter . . . revisor to insert effective date], except for camping unit transfer containers, shall occur at least when the wastewater of the tank reaches a level of one foot below the inlet invert of the tank.

(c) The servicing of POWTS treatment components other than those under pars. (a) and (b) existing prior to [the effective date of this chapter . . . revisor to insert effective date] shall be provided in accordance with the requirements specified by the manufacturer or designer of the component.

(d) 1. A POWTS that exists prior to [the effective date of this chapter . . . revisor to insert effective date] and that utilizes a treatment or dispersal component consisting in part of in situ soil shall be visually inspected at least once every 3 years to determine whether wastewater or effluent from the POWTS is ponding on the surface of the ground.

2. The inspection required by subd. 1. shall be performed by one of the following:

- a. A licensed master plumber.
- b. A licensed master plumber-restricted service.
- c. A certified POWTS inspector.
- d. A certified septage servicing operator under ch. NR 114.

Comm 83.55 REPORTING REQUIREMENTS. (1) (a) The owner of a POWTS or his or her agent shall report to the department or department authorized agent at the completion of each inspection or pumping event specified in the approved management plan, except for camping transfer containers.

(b) The owner of a POWTS existing prior to [the effect date of this chapter . . . revisor to insert effective date] or their agent shall report to the department or designated agent shall report to the department or designated agent the completion of each servicing or inspection event required under s. Comm 83.54 (4), except for camping transfer containers.

(2) The management and servicing reports required under sub. (1) shall be submitted to the department or designated agent:

- (a) In a manner specified by the department or designated agent;
- (b) Within 10 business days from the date of inspection or pumping; and
- (c) By the owner or the owner's agent.

(3) The management and servicing reports required under sub. (1) shall include the following information:

- (a) A POWTS identifying number.
- (b) The location of the POWTS.
- (c) The date of inspection or pumping.
- (d) The credential number of the individual performing the inspection or pumping.
- (e) Other information required by the approved management plan.

(4) The department or designated agent may require verification of any information contained in a management and servicing report.

Note: This subsection does not require the maintaining of test data which is collected voluntarily and which is not being collected to determine compliance with this chapter.

(5) DEPARTMENT RESPONSIBILITY. (a) The department shall maintain records relating to the operation, maintenance and repair of POWTS as specified in this section for a period of not less than 6 years.

(b) Upon request by a governmental unit, the department may delegate to the governmental unit the responsibility to maintain records relating to the operation, maintenance and repair of POWTS as specified in this section.

Subchapter VI
RECOGNIZED METHODS AND TECHNOLOGIES

Comm 83.60 PURPOSE. (1) This subchapter identifies methods and technologies that have been recognized by the department under s. Comm 84.10 (3) that conform with subchs. IV and V and that may be utilized in the design of POWTS for a specific project.

(2) This subchapter does not limit the use of other designs of POWTS or POWTS components the performance of which has been recognized under s. Comm 83.22 or Comm 84.10 (3) or both.

Comm 83.61 ACCEPTABLE METHODS AND TECHNOLOGIES. Pursuant to s. Comm 84.10 (3), the department recognizes at least the following methods and technologies to be utilized in the design of POWTS:

(1) Pressure Distribution Component Manual for Private Onsite Wastewater Treatment System, February 18, 1999.

(2) At-Grade Component Manual Using a Pressure Distribution System for Private Onsite Wastewater System, February 18, 1999.

(3) Mound Component Manual for Septic Tank Effluent for Private Onsite Wastewater System, February 18, 1999.

(4) Conventional Soil Absorption Component Manual for Private Onsite Wastewater System, February 18, 1999.

(5) Holding Tank Component Manual for Private Onsite Wastewater System, February 18, 1999.

(6) Single Pass Sand Filter Component Manual for Private Onsite Wastewater System, February 18, 1999.

(7) Recirculating Sand Filter Component Manual for Private Onsite Wastewater System, February 18, 1999.

Note: See appendix for information on obtaining copies of the above from the department.

Comm 83.62 PARAMETERS FOR USING ACCEPTABLE METHODS AND TECHNOLOGIES. When a design of a POWTS for a specific project utilizes a method or technology recognized under s. Comm 84.10 (3), a deviation from the specifications and limitations relative to the installation and maintenance of that method or technology shall constitute a violation of this chapter.

Chapter Comm 83**Appendix**

The material and information contained in this appendix is for clarification purposes only. Appendix material and information are numbered to correspond to the rule number as it appears in the text of the code. Material and information included in this appendix is subject to change without notice, including names, addresses, phone numbers and forms, and reflects information known at the time of publication.

A-83.21 (2) APPLICATION. The specific format of a sanitary permit application is specified by the department and may change depending on the data tracking needs of the department. The uniform application form issued by the department is to be used by all permit issuing agents. It may consist of a paper or electronic format, or both. The sanitary permit application form will require the applicant to report information pertinent to the ownership, use, location, system type, maintenance schedule, and responsible installer. Additionally, plans and specifications for the project must also be submitted with, and are part of, the permit application. Fees for the sanitary permit are based on a statutory minimum as cited in s. 145.19(2), Wis. Stats. and any additional costs levied by the issuing agent.

Table A-83.21-1 contains the names, addresses and telephone numbers of the local governmental units from which sanitary permit application forms may be obtained, and to which completed applications are submitted.

Sanitary Permit Issuing Agents
Table A-83.21-1

Governmental Unit	Address and Telephone	Governmental Unit	Address and Telephone
ADAMS	ADAMS COUNTY COURTHOUSE P O BOX 187 FRIENDSHIP WI 53934-0187 (608) 339-4222	BAYFIELD	BAYFIELD COUNTY COURTHOUSE P O BOX 58 WASHBURN WI 54891 (715) 373-6138; (715) 373-6139
ASHLAND	ASHLAND COUNTY COURTHOUSE 201 WEST SECOND ST. ROOM 109 ASHLAND WI 54806 (715) 682-7014	BROWN	BROWN COUNTY 305 E WALNUT ST. P.O. BOX 23600 GREEN BAY WI 54305-3600 (920) 448-4490
BARRON	BARRON COUNTY ZONING OFFICE COURTHOUSE AG CENTER 330 EAST LA SALLE AVE. BARRON WI 54812 (715) 537-6375	BUFFALO	BUFFALO COUNTY ZONING BUFFALO COUNTY COURTHOUSE P.O. BOX 492 ALMA WI 54610-0492 (608) 685-6217; (608) 6290

Governmental Unit	Address and Telephone	Governmental Unit	Address and Telephone
BURNETT	BURNETT COUNTY GOVERNMENT CENTER 7410 COUNTY ROAD K #102 SIREN WI 54872 (715) 349-2138	DOUGLAS	DOUGLAS COUNTY COURTHOUSE 1313 BELKNAP ST. ROOM 206 SUPERIOR WI 54880 (715) 395-1380
CALUMET	CALUMET COUNTY PLANNING ZONING AND SANITATION COURTHOUSE 206 COURT ST. CHILTON WI 53014 (920) 849-1442	DUNN	DUNN COUNTY ZONING 800 WILSON AVE. MENOMONIE WI 54751 (715) 232-1401
CHIPPEWA	CHIPPEWA COUNTY ZONING AND PLANNING DEPARTMENT 711 NORTH BRIDGE ST CHIPPEWA FALLS WI 54729 (715) 726-7943; (715) 726-7944	EAU CLAIRE	EAU CLAIRE CITY/COUNTY COURTHOUSE 720 SECOND AVE. EAU CLAIRE WI 54703 (715) 839-4718
CLARK	CLARK COUNTY COURTHOUSE PLANNING, ZONING AND SOLID WASTE 517 COURT ST. ROOM 204A NEILLSVILLE WI 54456 (715) 743-5130	FLORENCE	FLORENCE COUNTY COURTHOUSE 501 LAKE AVE. P.O. BOX 627 FLORENCE WI 54121 (715) 528-3206
COLUMBIA	COLUMBIA COUNTY ADMINISTRATION BUILDING P.O. BOX 177 PORTAGE WI 53901	FOREST	FOREST COUNTY COURTHOUSE 200 EAST MAIN ST. CRANDON WI 54520-1414 (715) 478-3893
CRAWFORD	CRAWFORD COUNTY 111 WEST DUNN ST. PRAIRIE DU CHIEN WI 53821 (608) 326-0294	GRANT	GRANT COUNTY SANITATION DEPARTMENT 125 SOUTH MONROE ST. LANCASTER WI 53813-1635 (608) 723-4394
DANE	DANE COUNTY ENVIRONMENTAL HEALTH DIVISION 1202 NORTHPORT DR. RM. 154 MADISON WI 53704 (608) 242-6515	GREEN	GREEN COUNTY P.O. BOX 358 MONROE WI 53566 (608) 328-9423; (608) 328-9446
DODGE	DODGE COUNTY DEPARTMENT OF PLANNING AND DEVELOPMENT COURTHOUSE 127 EAST OAK ST. JUNEAU WI 53039 (920) 386-3700	GREEN LAKE	GREEN LAKE COUNTY COURTHOUSE 492 HILL ST. GREEN LAKE WI 54941-3188 (920) 294-4027
DOOR	DOOR CO BOARD OF HEALTH COURTHOUSE 421 NEBRASKA STURGEON BAY WI 54235-0670 (920) 746-2398 EXT. 2218	GREEN LAKE SANITATION DISTRICT	GREEN LAKE SANITATION DISTRICT P.O. BOX 417 GREEN LAKE WI 54941 (920) 294-3261
		IOWA	IOWA COUNTY COURTHOUSE 222 NORTH IOWA ST. DODGEVILLE WI 53533 (608) 935-0398; (608) 935-0333; (608) 935-0330

Governmental Unit	Address and Telephone	Governmental Unit	Address and Telephone
IRON	IRON COUNTY COURTHOUSE HURLEY WI 54534 (715) 561-5414	LINCOLN	LINCOLN COUNTY COURTHOUSE 1110 EAST MAIN ST. MERRILL WI 54452 (715) 536-0333
JACKSON	JACKSON COUNTY PUBLIC HEALTH DEPARTMENT COURTHOUSE 307 MAIN ST. BLACK RIVER FALLS WI 54615 (715) 284-0220	MANITOWOC	MANITOWOC COUNTY 1701 MICHIGAN AVE. MANITOWOC WI 54220 (920) 683-4185; (920) 683-4186
JEFFERSON	JEFFERSON COUNTY COURTHOUSE 320 SOUTH MAIN ST. RM 214 JEFFERSON WI 53549 (920) 674-7130	MARATHON	MARATHON COUNTY 210 RIVER DR. WAUSAU WI 54403-5449 (715) 732-7535
JUNEAU	JUNEAU COUNTY ZONING OFFICE 250 OAK ST. MAUSTON WI 53948-1345 (608) 847-4718	MARINETTE	MARINETTE COUNTY SOURTHOUSE 1926 HALL AVE. P.O. BOX 320 MAINETTE WI 54143-0320 (715) 732-7535
KENOSHA	KENOSHA COUNTY PLANNING AND DEVELOPMENT KENOSHA COUNTY CENTER 19600 75 TH ST. P.O. BOX 520 BRISTOL WI 53104-0520 (414) 857-1895	MARQUETTE	MARQUETTE COUNTY COURTHOUSE 77 WEST PARK ST. P.O. BOX 21 MONTELLO WI 53949 (608) 297-9159
KEWAUNEE	KEWAUNEE COUNTY COURTHOUSE 613 DODGE ST. KEWANUEE WI 54216 (920) 388-4410 EXT. 132	MENOMINEE	MENOMINEE ZONING/ ASSESSORS OFFICE MENOMINEE COUNTY COURTHOUSE P.O. BOX 279 KESHENA WI 54135-0279 (715) 799-3301; (715) 799-3096
LA CROSSE	LA CROSSE COUNTY DIVISION OF ENVIRONMENTAL HEALTH 300 NORTH 4 TH ST. LA CROSSE, WI 54601-3299 (608) 785-9771; (608) 785-9731; (608) 785-9726; (608) 785-9730; (608) 785-7816	MILWAUKEE COUNTY BROWN DEER, VILLAGE OF	VILLAGE OF BROWN DEER 4800 WEST GREEN BROOK DR. BROWN DEER WI 53223 (414) 357-0144
LAFAYETTE	LAFAYETTE COUNTY AG CENTER – COURTHOUSE 627 WASHINGTON ST DARLINGTON WI 53530 (608) 776-4830	MILWAUKEE COUNTY CUDAHY	CITY OF CUDAHY MUNICIPAL BUILDING 5050 SOUTH LAKE DR. CUDAHY WI 53110 (414) 471-8400
LANGLADE	LANGLADE COUNTY LAND RECORDS & REGULATIONS RESOURCE CENTER 837 CLERMONT ST. P.O. BOX 505 ANTIGO WI 54409 (715) 536-0333	MILWAUKEE COUNTY FRANKLIN	CITY OF FRANKLIN CITY HALL 9229 WEST LOOMIS ROAD FRANKLIN WI 53212 (414) 425-0084
		MILWAUKEE COUNTY GLENDALE	CITY OF GLENDALE 5909 NORHT MILWAUKEE RIVER PKWY. GLENDALE WI 53209 (414) 423-2100

Governmental Unit	Address and Telephone	Governmental Unit	Address and Telephone
MILWAUKEE COUNTY GREENDALE	VILLAGE OF GREENDALE VILLAGE HALL 6500 NORTHWAY GREENDALE WI 53129 (414) 423-2100	PIERCE	PIERCE COUNTY COURTHOUSE P. O. BOX 647 ELLSWORTH WI 54011 (715) 273-6747
MILWAUKEE COUNTY GREENFIELD	CITY OF GREENFIELD CITY HALL 7325 WEST FOREST HOME AVE. GREENFIELD WI 53220 (414) 543-5465 EXT. 328	POLK	POLK COUNTY ZONING ADMINISTRATION COUNTY COURTHOUSE 100 POLK COUNTY PLAZA BALSAM LAKE WI 54810 (715) 485-9279
MILWAUKEE COUNTY HALES CORNERS	VILLAGE OF HALES CORNERS 5635 SOUTH NEW BERLIN RD. HALES CORNERS WI 53130 (414) 529-6160	PORTAGE	PORTAGE COUNTY COURTHOUSE 1516 CHURCH ST. STEVENS POINT WI 54481 (715) 346-1334
MILWAUKEE COUNTY MILWAUKEE	CITY OF MILWAUKEE MUNICIPAL BUILDING RM 1017 841 NORTH BROADWAY MILWAUKEE WI 53202 (414) 286-3364	PRICE	PRICE COUNTY NORMAL BUILDING ROOM 205 PHILLIPS WI 54555 (715) 339-3272
MILWAUKEE COUNTY OAK CREEK	CITY OF OAK CREEK CITY HALL 8640 SOUTH HOWELL AVE. OAK CREEK WI 53154 (414) 768-6545	RACINE	RACINE COUNTY CODE ADMINISTRATION DEPARTMENT IVES GROVE BUILDING 14200 WASHINGTON AVE. STURTEVANT WI 53177 (414) 886-8475
MILWAUKEE COUNTY RIVER HILLS	VILLAGE OF RIVER HILLS VILLAGE HALL 7650 NORTH PHEASANT LN. RIVER HILLS WI 53217 (414) 352-8213	RICHLAND	RICHLAND COUNTY COURTHOUSE 181 WEST SEMINARY ST. RICHLAND CENTER WI 53581 (608) 647-2447
MILWAUKEE COUNTY ST. FRANCIS	CITY OF ST. FRANCIS 4235 SOUTH NICHOLSON AVE. ST. FRANCIS WI 53235 (414) 481-2300	ROCK	ROCK COUNTY ENVIRONMENTAL HEALTH DEPARTMENT P. O. BOX 1143 JANESVILLE WI 53547-1143 (608) 757-5441
MILWAUKEE COUNTY SOUTH MILWAUKEE	CITY OF SOUTH MILWAUKEE 2424 15 TH AVE. SOUTH MILWAUKEE WI 53172 (414) 762-2222	RUSK	RUSK COUNTY ZONING OFFICE 311 MINER AVE. EAST LADYSMITH WI 54848 (715) 532-2181
OZAUKEE	OZAUKEE COUNTY ENVIRONMENTAL HEALTH DEPARTMENT COURTHOUSE 121 WEST MAIN ST. P. O. BOX 994 PORT WASHINGTON WI 53074-0994 (414) 284-8313; (414) 284-8315 (414) 284-8316; (414) 284-8318	ST. CROIX	ST. CROIX COUNTY ZONING OFFICE 1101 CARMICHAEL RD. HUDSON WI 54016 (715) 386-4680; (715) 386-4684 (715) 386-4682; (715) 386-4683
PEPIN	PEPIN COUNTY COURTHOUSE 550 7 TH AVE. WEST P. O. BOX 39 DURAND WI 54736 (715) 672-8897		

Governmental Unit	Address and Telephone	Governmental Unit	Address and Telephone
SAUK	SAUK COUNTY PLANNING AND ZONING SAUK COUNTY WEST SQUARE BUILDING 505 BROADWAY BARABOO WI 53913 (608) 355-3285	WAUKESHA	WAUKESHA COUNTY DEPARTMENT OF PARKS AND LAND USE DIVISION OF ENVIRONMENTAL HEALTH 1320 PEWAUKEE RD. RM. 260 WAUKESHA WI 53188 (414) 896-8300
SAWYER	SAWYER COUNTY ZONING ADMINISTRATION COURTHOUSE P. O. BOX 668 HAYWARD WI 54843-0668 (715) 634-8288	SHEBOYGAN	SHEBOYGAN COUNTY COURTHOUSE PLANNING DEPARTMENT 615 NORTH 6 TH ST. SHEBOYGAN WI 53081 (920) 459-3060
SHAWANO	SHAWANO COUNTY COURTHOUSE 311 NORTH MAIN ST. SHAWANO WI 54166 (715) 526-6766; (715) 524-233-21	WAUSHARA	WAUSHARA COUNTY ZONING P. O. BOX 149 WAUTOMA WI 54982-0149 (920) 787-0453
TAYLOR	TAYLOR COUNTY ZONING OFFICE 224 SOUTH 2 ND ST. ROOM 110 MEDFORD WI 54451 (715) 748-1485	WISCONSIN STATE OF	DEPARTMENT OF COMMERCE SAFETY & BUILDINGS DIVISION 201 WEST WASHINGTON AVE. P. O. BOX 2658 MADISON WI 53701-2658
TREMPEALEAU	TREMPEALEAU COUNTY ZONING DEPARTMENT COURTHOUSE 36245 MAIN ST. P. O. BOX 67 WHITEHALL WI 54773-9430 (715) 538-2311 EXT. 222 or 223	WINNEBAGO	WINNEBAGO COUNTY PLANNING AND ZONING COURTHOUSE P. O. BOX 2808 OSHKOSH WI 54903-2808 (920) 236-4844
VERNON	VERNON COUNTY COURTHOUSE P. O. BOX 306 VIROQUA WI 54665 (608) 637-7018	WAUPACA	WAUPACE COUNTY COURTHOUSE 811 HARDING ST. WAUPACE WI 54981-2072 (715) 258-6255; (715) 258-6257
VILAS	VILAS COUNTY COURTHOUSE P. O. BOX 369 EAGLE RIVER WI 54521 (715) 479-3620	WALWORTH	WALWORTH COUNTY COURTHOUSE ANNEX LAKELAND COMPLEX W3929 COUNTY NN ELKHORN WI 53121 (414) 741-3394
WASHBURN	WASHBURN COUNTY COURTHOUSE P. O. BOX 506 SHELL LAKE WI 54871-0506 (715) 468-2666	WOOD	WOOD COUNTY ZONING OFFICE COURTHOUSE 400 MARKET ST. WISCONSIN RAPIDS WI 54494-8095 (715) 421-8466
WASHINGTON	WASHINGTON COUNTY LAND USE AND PARK DEPARTMENT PUBLIC AGENCY CENTER SUITE 2300 333 EAST WASHINGTON ST. WEST BEND WI 53095-2584 (414) 335-4445		

A-83.21 (3) PROCESSING. The state sanitary permit is issued when evidence and documentation is presented by the owner of the property that minimum code standards have been or will be met.

[Insert sample form of sanitary permit]

Chapter 145 Wisconsin Statutes provides some direction as to the issuance of sanitary permits as follows:

145.135 Sanitary permits.

(1) Validity. In this section, "sanitary permit" means a permit issued by the department or any governmental unit responsible for the regulation of private sewage systems for the installation of a private sewage system. No person may install a private sewage system unless the owner of the property on which the private sewage system is to be installed holds a valid sanitary permit. A sanitary permit is valid for 2 years from the date of issue and renewable for similar periods thereafter. A governmental unit responsible for the regulation of private sewage systems may not charge more than one fee for a sanitary permit or the renewal of a sanitary permit in any 12-month period. A sanitary permit shall remain valid to the end of the established period, notwithstanding any change in the state plumbing code or in any private sewage system ordinance during that period. A sanitary permit may be transferred from the holder to a subsequent owner of the land, except that the subsequent owner must obtain a new copy of the sanitary permit from the issuing agent. The results of any percolation test or other test relating to the disposal of liquid domestic wastes into the soil shall be retained by the governmental unit responsible for the regulation of private sewage systems where the property is located. The governmental unit responsible for the regulation of private sewage systems shall make the test results available to an applicant for a sanitary permit and shall accept the test results as the basis for a sanitary permit application unless the soil at the test site is altered to the extent that a new soil test is necessary.

(2) Notice. A sanitary permit shall include a notice displayed conspicuously and separately on the permit form, to inform the permit holder that:

(a) The purpose of the sanitary permit is to allow installation of the private sewage system described in the permit.

(b) The approval of the sanitary permit is based on regulations in force on the date of approval.

(c) The sanitary permit is valid and may be renewed for a specified period.

(d) Changed regulations will not impair the validity of a sanitary permit.

(e) Renewal of the sanitary permit will be based on regulations in force at the time renewal is sought, and that changed regulations may impede renewal.

(f) The sanitary permit is transferable.

145.19 Sanitary permit.

(1) Requirement; information; forms. No septic tank may be purchased and no private sewage system may be installed unless the owner of the property on which the private sewage system is to be installed holds a valid sanitary permit from the governmental unit responsible for the regulation of private sewage systems in which the property is located. The department shall prescribe the information to be included in the sanitary permit and furnish sanitary permit forms to the governmental unit. The applicant shall submit the completed sanitary permit to the governmental unit. The governmental unit shall approve or disapprove the sanitary permit according to the rules promulgated by the department under this chapter. No person may sell at retail, as defined under s. 100.201 (1) (d) , a septic tank for installation in this state unless the purchaser holds a valid sanitary permit issued under this section.

(2) Fee. No fee for a sanitary permit may be less than \$61, or the amount determined under department rule. The governing body for the governmental unit responsible for the regulation of private sewage systems may establish a fee for a sanitary permit which is more than \$61, or the amount determined under department rule.

(3) Copy of permit forwarded to the department. The governmental unit responsible for the regulation of private sewage systems shall forward a copy of each valid sanitary permit and \$20, or the amount determined under department rule, of the fee to the department within 90 days after the permit is issued.

(4) Use of fee. The portion of this fee retained by the governmental unit responsible for the regulation of private sewage systems shall be used for the administration of private sewage system programs.

(5) Fee adjustment. The department, by rule promulgated under ch. 227 , may adjust the minimum permit fee under sub. (2) and the fee portion forwarded under sub. (3).

(6) Groundwater fee. In addition to the fee under sub. (2) , the governmental unit responsible for the regulation of private sewage systems shall collect a groundwater fee of \$25 for each sanitary permit. The governmental unit shall forward this fee to the department together with the copy of the sanitary permit and the fee under sub. (3) . The moneys collected under this subsection shall be credited to the environmental fund for environmental management.

A-83.21 (6) RENEWALS. Sanitary permit renewals are completed in compliance with s.145.135 (1) and 145.135 (2) (e), Wis. Stats. A completed sanitary permit renewal application form must be submitted to the local permit issuing agent.

[Insert sample renewal form]

A-83.22 (2) PLANS AND SPECIFICATIONS. A POWTS plan review application form must be completed and submitted with a plan submittal. The application form is uniform state-wide and includes a worksheet to calculate the appropriate fees for the project.

[Insert sample plan review application form]

A-83.22 (3) PLAN REVIEW PROCESS. All proposed POWTS installations require plan review prior to sanitary permit issuance. Projects subject to department review include all projects under Table 83.22-1, and many of the projects under Table 83.22-2. Designated agents may review projects included in Table 83.22-2.

[Insert current county agent plan review listing]

Commerce Plan Review Offices

Hayward Office
15837 USH 63
Hayward WI 54843
(715) 634-4870

LaCrosse Office
2226 Rose Street
LaCrosse WI 54603
(608) 785-9334

Madison Office
201 W. Washington Ave
PO Box 7162
Madison WI 53707-7162
(608) 266-3151

Shawano Office
1340 Green Bay Street
Suite 300
Shawano WI 54166
(715) 524-3626

Green Bay Office
2331 San Luis Place
Green Bay WI 54304
(920) 492-5601

Waukesha Office
401 Pilot Court Ste C
Waukesha WI 53188
(414) 548-8606

A-83.25 (2) ISSUANCE OF BUILDING PERMITS. A building permit is defined in s. Comm 81.01 (44), Wis. Adm. Code, as any written permission from a municipality that allows construction to commence on a structure. In effect, this means that land use and zoning permits, as well as other similar permits that constitute permission to construct are considered building permits.

Prior to building permit issuance, the issuing agent has a statutory responsibility, under s. 66.036, Wis. Stats., to consider whether or not the proposed structure requires connection to a private onsite wastewater treatment system (POWTS), or if the construction will interfere with the operation of an existing POWTS.

Section 66.036, Stats. Building on unsewered property. (1) No county, city, town or village may issue a building permit for construction of any structure requiring connection to a private domestic sewage treatment and disposal system unless a system satisfying all applicable regulations already exists to serve the proposed structure or all permits necessary to install such a system have been obtained.

(2) Before issuing a building permit for construction on any structure on property not served by a municipal sewage treatment plant, the county, city, town or village shall determine that the proposed construction does not interfere with a functioning private domestic sewage treatment and disposal system. The county, city, town or village may require building permit applicants to submit a detailed plan of the owner's existing private domestic sewage treatment and disposal system.

A-83.25 (2) (e) Setbacks. Horizontal setbacks from encumbrance for new POWTS installations are in conformance with Table Comm 83.43 -1 or the rule in effect at the time the system was installed, whichever is less. For setback distances associated with previous administrative codes refer to the previous code issue or the following table.

[Insert Table on previous code setbacks]

A-83.43 (3) (a) Normal wastewater flow from a dwelling is estimated at 2 persons per bedroom. However, when occupancy is less than or greater than 2 persons per bedroom POWTS designers may estimate the combined graywater and blackwater flows using the equation pursuant to Comm 83.43 (3) (b).

A-83.43 (6) COMMERCIAL FACILITIES. Table A-83.43-1 may be used to estimate wastewater flows from a commercial building.

Table A-83.43-1 Public Facility Wastewater Flows		
Source	Unit	Estimated Wastewater Flow (gpd)
Apartment or Condominium	Bedroom	100
Assembly hall (no kitchen)	Person (10 sq. ft./person)	1.3
Bar or cocktail lounge (no meals served)	Patron (10 sq. ft./patron)	4
Bar or cocktail lounge* (w/meals – all paper service)	Patron (10 sq. ft./patron)	8
Beauty salon	Station	90
Bowling alley	Bowling lane	80
Bowling alley (with bar)	Bowling lane	150
Camp, day and night	Person	25
Camp, day use only (no meals served)	Person	10
Campground or Camping Resort	Space, with sewer connection and/or service building	30
Campground sanitary dump station	Camping unit or RV served	25
Catch basin	Basin	65
Church (no kitchen)	Person	2
Church* (with kitchen)	Person	5
Dance hall	Person (10 sq. ft./person)	2
Day care facility (no meals prepared)	Child	12
Day care facility* (with meal preparation)	Child	16
Dining hall* (kitchen waste only without dishwasher and/or food waste grinder)	Meal served	2
Dining hall* (toilet and kitchen waste without dishwasher and/or food waste grinder)	Meal served	5
Dining hall* (toilet and kitchen waste with dishwasher and/or food waste grinder)	Meal served	7
Drive-in restaurant* (all paper service with inside seating)	Patron seating space	10
Drive-in restaurant* (all paper service without inside seating)	Vehicle space	10
Drive-in theater	Vehicle space	3
Employees (total all shifts)	Employee	13
Floor drain (not discharging to catch basin)	Drain	25
Gas station / convenience store	Patron	3

Table A-83.43-1
Public Facility Wastewater Flows
 (continued)

Source	Unit	Estimated Wastewater Flow (gpd)
Gas station (with service bay)		
Patron	Patron	3
Service bay	Service bay	50
Hospital*	Bed space	135
Hotel, motel or tourist rooming house	Room	65
Medical office building		
Doctors, nurses, medical staff	Person	50
Office personnel	Person	13
Patients	Person	6.5
Migrant labor camp (central bathhouse)	Employee	20
Mobile Home (Manufactured home) (served by its own POWTS)	Bedroom	100
Mobile home park	Mobile home site	200
Nursing, Rest Home, Community Based Residential Facility	Bed space	65
Outdoor sport facilities (toilet waste only)	Patron	3.5
Parks (toilets waste only)	Patron (75 patrons/acre)	3.5
Parks (toilets and showers)	Patron (75 patrons/acre)	6.5
Public shower facility	Shower taken	10
Restaurant*, 24-hr. (dishwasher and/or food waste grinder only)	Patron seating space	4
Restaurant*, 24-hr. (kitchen waste only without dishwasher and/or food waste grinder)	Patron seating space	12
Restaurant, 24-hr. (toilet waste)	Patron seating space	28
Restaurant*, 24-hr. (toilet and kitchen waste without dishwasher and/or food waste grinder)	Patron seating space	40
Restaurant*, 24-hr. (toilet and kitchen waste with dishwasher and/or food waste grinder)	Patron seating space	44
Restaurant* (dishwasher and/or food waste grinder only)	Patron seating space	2
Restaurant* (kitchen waste only without dishwasher and/or food waste grinder)	Patron seating space	6
Restaurant (toilet waste)	Patron seating space	14
Restaurant* (toilet and kitchen waste without dishwasher and/or food waste grinder)	Patron seating space	20
Restaurant* (toilet and kitchen waste with dishwasher and/or food waste grinder)	Patron seating space	22
Retail store	Patron (70% of total retail area ÷ 30 sq. ft. per patron)	1
School* (with meals and showers)	Classroom (25 students/classroom)	500
School* (with meals or showers)	Classroom (25 students/classroom)	400

Table A-83.43-1
Public Facility Wastewater Flows
 (continued)

Source	Unit	Estimated Wastewater Flow (gpd)
School (without meals or showers)	Classroom (25 students/classroom)	300
Self-service laundry (toilet waste only)	Clothes washer	33
Self-service laundry (with only residential clothes washers)	Clothes washer	200
Swimming pool bathhouse	Patron	6.5

* = May be high strength waste

A-83.43 (6) (a). Actual meter readings may be used to calculate the combined estimated design wastewater flow from a dwelling. To calculate the estimated design wastewater flow use the following formula and compare the answer to the peak metered flow. Choose the larger of the two estimated design flows.

$$(\text{total meter flow/number of readings})(1.5) = \text{estimated design wastewater flow}$$

The frequency of meter readings should be daily for commercial.

A-83.43 (6) (b) A detailed per capita and per function flow may be established for commercial facilities. The per function flow ratings shall be substantiated by manufactures data of the per function flow and detailed use data from the facility in question or a similar facility under similar conditions of use. Estimated design wastewater flow shall be at least 1.5 times the total estimated daily flow calculated from the per capita and per function flow information

A-83.43 (7) ESTIMATING CONTAMINANT LOADS

Pathogenic contaminant load may be estimated based on data collected by a reputable testing or research facility.

**Typical Data on the Unit Loading Factors and
Expected Wastewater Contaminant Loads
from Individual Residences**

Contaminant	Unit Loading Factor lb/capita per day	Value		
		Unit	Range	Typical
BOD ₅	0.180	mg/L	216-540	392
SS	0.200	mg/L	240-600	436
NH ₃ as N	0.007	mg/L	7-20	14
Org. N as N	0.020	mg/L	24-60	43
TKN as N	0.027	mg/L	31-80	57
Org P as P	0.003	mg/L	4-10	7
Inorg. P as P	0.006	mg/L	6-17	12
Grease		mg/L	45-100	70
Total Coliform		cfu/100mL	10 ⁷ -10 ¹⁰	10 ⁸

A-83.43 (9) (g) ANCHORING SYSTEM COMPONENTS.

The anchoring of components to counter buoyant forces due to saturated soil conditions can be determined using the following formula:

$$\begin{array}{l} \text{Weight of the component plus} \\ \text{the weight of the anchor} \end{array} = 1.5 \text{ times (volume of water the} \\ \text{component displaces) times [the} \\ \text{weight of water (62.4} \\ \text{pounds/cubic foot at 39°F)]}$$